REMARKS

This is a full and timely response to the non-final Office Action dated January 4, 2010. Applicants thank the Examiner for the withdrawal of the finality of the previous Office Action.

Present Status of the Application

Claims 1-6 are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter.

Claims 1 and 3-6 are rejected under 35 U.S.C. 103(a) as being assertedly unpatentable over Shiragaki (U.S. Patent Application Publication No. 2002/0162045) in view of Pierson Jr. (U.S. Patent No. 6,633,566).

Claim 2 is rejected under 35 U.S.C. 103(a) as being assertedly unpatentable over Shiragaki in view of Pierson Jr. and further in view of Conoscenti et al. (U.S. Patent No. 5,627,836; hereinafter " Conoscenti ").

After carefully considering the Office Action and the cited references, Applicants have amended claims 1, 3, and 5, and added new claims 7-9. Applicants respectfully traverse all the rejections for reasons set forth in detail below. Applicants respectfully submit that no new matter has been entered by way of amendment. Upon entry of the above amendment, Applicants respectfully submit that all the pending claims are in proper condition for allowance. Withdrawal of all the rejections and allowance of all the pending claims are earnestly requested.

Response to Claim Rejections under 35 U.S.C 101

Claims 1-6 are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter.

In response thereto, Applicants have amended claim 1, so as to respectfully traverse said rejections on the following grounds.

According to *In re Bilski*, 545 F.3d 943, 88 U.S.P.Q.2d 1385 (Fed. Cir. 2008), the correct

test for whether the claimed invention is patentable subject matter is the "machine-or-transformation test," that is, whether the claimed invention is tied to a particular machine or transforms an article from one object or state to another. Claim 1, as amended, and claims 2-6 dependent therefrom is implemented through a physical communication network, therefore tied to a machine. Furthermore, the low layer processing module connects the broken passage to set up a bypass which can be a physical line (Claim 6), that transforms an unconnected bypass into a connected physical line, which meets the machine test and transformation test.

Response to Claim Rejections under 35 U.S.C 103

Claims 1 and 3-6 are rejected under 35 U.S.C. 103(a) as being assertedly unpatentable over Shiragaki in view of Pierson Jr.

Claim 2 is rejected under 35 U.S.C. 103(a) as being assertedly unpatentable over Shiragaki in view of Pierson Jr. and further in view of Conoscenti.

In response thereto, Applicants have amended claim 1, so as to respectfully traverse said rejections on the following grounds.

Claim 1, as currently amended, recites the following features:

"when high layer processing module detecting said high layer processing module encountering a trouble, it will inform low layer processing module;" and

"when low layer processing module detecting high layer processing module encountering the trouble, the low layer transmission passage ... is broken, and the low layer processing module connects the broken passage to set up a bypass."

In the present invention, 1) the high layer processing module informs the low layer processing module at the moment the high layer processing module detects that encounters trouble; there are no additional steps between said detection and said information; and 2) the low layer processing module breaks the low layer transmission passage and sets up the bypass immediately when the low layer processing module detects that the high layer processing module has encountered trouble; there are no additional steps between said detection and said breakage

and said setting up of the bypass.

In Shiragaki, on the other hand, the A layer only informs the B layer via the failure recover starting notice 203 after the A layer has started the recover operation 205. In other words, for the A layer, there is an intermediate step of initializing the recover operation 205 between the failure detection 201 and the transmission of the failure recover starting notice 203. In addition, the B layer only sets up the bypass after the B layer has completed much of its own recover operation 206; the B layer does not set up the bypass immediately when it receives the failure recover starting notice 203 (please note the distance between the arrowheads of 203 and 208).

Moreover, Applicants further assert that the two above-mentioned features are not disclosed by Shiragaki for the following reasons.

As clearly shown in claim 1, the sole event required in order to trigger the breakage and the setting up of the bypass is the high layer processing module encountering trouble. In contrast, in order for the B layer in Shiragaki to set up the bypass, failure detection and failure recovery operations in both the A and B layers are necessary. This evident in FIG. 4 of Shiragaki: if a failure is detected in only the A layer, failure recovery in the A layer is initiated (step 302), the failure recovery starting notice is sent to the B layer (step 303); the A layer determines whether it receives the failure recovery starting notice from the B layer (step 304); since there is no failure in the B layer, the A layer enters step 314; the A layer then goes through the loop between steps 304 and 314 until it has completed its own recovery process; and the A layer completes the failure recovery operation. During the above process, no bypass is ever set up if there is only a defect in one of the layers. Hence, Shiragaki is different from the invention claimed in claim 1; in particular, different from the above-mentioned features of claim 1.

Furthermore, claim 1 recites "when the low layer processing module detecting that the high layer processing module encounters the trouble, **the low layer transmission passage between the low layer processing module and the high layer processing module is broken, and the low layer processing module connects the broken passage to set up a bypass, so as to isolate the high layer processing module encountering a trouble**.

In the present invention, the same broken passage is connected to set up a bypass. Clearly, neither Shiragaki, nor Pierson Jr. teaches or even remotely suggests such a feature.

Therefore, Applicants respectfully submit that claim 1 as well as its dependent claims 3-6 are is patentable over Shiragaki and Pierson Jr..

In addition to these dependent claims contain features that further distinguish over the cited references. For example, claim 5 recites that "said bypass is actual connection of a physical line". None of the cited references teaches or suggests such a feature.

For the same reasons discussed above, claim 1 is patentable over Shiragaki, Pierson Jr., and Conoscent. For at least the same reasons, dependent claim 2 is also patentable.

New Claims

New dependent claims 7-9 are added. These new claims are patentable for at least the same reasons as their base claim 1. In addition, these dependent claims contain features that further distinguish over the cited references. For example, new claim 8 recites that "after the low layer processing module detects that the high layer processing module encounters the trouble, the low layer transmission passage between the low layer processing module and the high layer processing module is broken, and the low layer processing module connects the broken passage to set up a bypass **without checking whether the lower layer processing module encounters a trouble**". The underlined limitation is again the teaching of Shiragaki.

CONCLUSION

For at least the foregoing reasons, it is believed that all the pending claims 1-9 of the present application patently define over the cited art and are in proper condition for allowance. If the Examiner believes that a telephone conference would expedite the examination of the above-identified patent application, the Examiner is invited to call the undersigned.

Respectfully submitted,
J.C. PATENTS

Date: April 2, 2010

/JIAWEI HUANG/
Jiawei Huang
Registration No. 43,330

4 Venture, Suite 250
Irvine, CA 92618
Tel.: (949) 660-0761
Fax: (949)-660-0809
Email: jcpi@msn.com